METHOD AND DEVICE FOR AUTOMATIC DETECTION OF A GRADUATED COMPRESSION PADDLE

ABSTRACT OF THE DISCLOSURE

An acquisition is made of a base digital image containing the paddle, and the base image is subdivided into rows of N elementary pixels respectively assigned luminous intensity values, the rows of elementary pixels all being parallel to a general direction of graduation of the paddle. N autocorrelations of the vector of luminous intensity values associated with the row of elementary pixels are made for each row, with respectively the vector and the N-1 vectors successively shifted by 1 elementary pixel, so as to obtain for each row a vector of N autocorrelation values. A Fourier transform treatment is carried out on each autocorrelation vector, in order to obtain an energy frequency spectrum. The energy value at the frequency of the graduated marks is compared for each spectrum with a predetermined threshold value and the presence of the paddle is deduced therefrom.